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EXAMINER

RIES, LAURIE ANNE

ART UNIT	PAPER NUMBER
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2176

DATE MAILED: 08/20/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/960,233	Applicant(s) WANG ET AL.	
	Examiner Laurie Ries	Art Unit 2176	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 20 September 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-68 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-68 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 20 September 2001 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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DETAILED ACTION

Specification

Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

More detail should be provided within the abstract so as to describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

Drawings

The drawings are objected to under 37 CFR 1.83(a) because they fail to show recognizer 211 as described in the specification, page 14, line 25. Any structural detail that is essential for a proper understanding of the disclosed invention should be shown in the drawing. MPEP § 608.02(d). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a

drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Objections

Claim 25 is objected to because of the following informalities:

- The word "for" is extraneous and should be removed.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an

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application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 3-6, 8-9, 26, 28-30, 32, 35, 37, 40-43, 45-50, and 56-57 are rejected under 35 U.S.C. 102(e) as being anticipated by Barclay (U.S. Patent 5,960,399).

As per claim 1, Barclay discloses a computer readable medium having a markup language for execution on a client device in a client/server system where the markup language includes an instruction indicating a grammar to associate with input entered through the client device. (See Barclay, Column 8, lines 26-28).

As per claim 3, Barclay discloses that the grammar is for speech recognition, which is included in the list of possible grammars set forth in claim 3. (See Barclay, Column 8, lines 26-28).

As per claim 4, Barclay discloses that the instruction indicating a grammar includes a reference to a grammar for speech recognition. (See Barclay, Column 8, lines 26-28).

As per claim 5, Barclay discloses that the markup language is HTML, which is included in the list of possible markup languages set forth in claim 5. (See Barclay, Column 8, lines 42-46).

As per claim 6, Barclay discloses that the markup language includes a scripting language, in the form of an embedded Java applet. (See Barclay, Column 8, lines 48-51).

As per claim 8, Barclay discloses that the markup language includes an instruction for receiving a recognition result pertaining to recognized speech and

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associating the result with a data field on the client device. (See Barclay, Column 8, lines 48-64).

As per claim 9, Barclay discloses that the instruction for receiving a recognition result associates the recognition result to a number of data fields. (See Barclay, Column 8, lines 65-67, and Column 9, lines 1-15).

As per claim 26, Barclay discloses a computer readable medium including instructions readable by a computer which, when implemented, cause the computer to handle information by performing steps including receiving a markup language page from a web server having a field for input data (See Barclay, Column 8, lines 65-67, and Column 9, lines 1-15), receiving input from a user related to the field (See Barclay, Column 9, lines 9-15), and sending data indicative of the input and an indication of a grammar for recognition. (See Barclay, Column 9, lines 16-20).

As per claim 28, Barclay discloses that the indication includes a reference to a language for speech recognition. (See Barclay, Column 9, lines 34-38).

Claim 29 is rejected on the same basis as claim 5.

Claim 30 is rejected on the same basis as claim 6.

As per claim 32, Barclay discloses that the input includes speech, and also includes instructions which, when implemented, include processing the input speech to provide data indicative of the input speech. (See Barclay, Column 9, lines 16-30).

As per claim 35, Barclay discloses that the input includes speech and the grammar includes a speech recognition grammar. (See Barclay, Column 8, lines 22-28).

Claim 37 is rejected on the same basis as claim 26.

Claim 40 is rejected on the same basis as claim 5.

Claim 41 is rejected on the same basis as claim 8.

Claim 42 is rejected on the same basis as claim 9.

Claim 43 is rejected on the same basis as claim 6.

As per claim 45, Barclay discloses a computer readable medium having a markup language for execution on a client device in a client/server system, where the markup language includes an instruction indicating an object model element having attributes for recognition. (See Barclay, Column 4, lines 57-67, Column 5, lines 1-11, and Column 8, lines 26-28 and lines 42-48).

Claim 46 is rejected on the same basis as claim 3.

Claim 47 is rejected on the same basis as claim 4.

Claim 48 is rejected on the same basis as claim 8.

Claim 49 is rejected on the same basis as claim 9.

As per claim 50, Barclay discloses that the markup language includes instructions for handling an event, which is an action or occurrence detected by a program (www.webopedia.com). (See Barclay, Column 8, lines 48-64).

Claim 56 is rejected on the same basis as claim 5.

Claim 57 is rejected on the same basis as claim 6.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 2 and 39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claims 1 and 37 above, and further in view of Wohlsen (U.S. Publication 2003/0125944 A1).

As per claims 2 and 39, Barclay discloses the limitations of claims 1 and 37 as described above. Barclay does not disclose expressly that the instruction indicating a grammar provides a reference to a location of the grammar.

Wohlsen discloses that the grammar is stored in a special location in grammar storage. (See Wohlsen, Page 3, paragraph 0037). Barclay and Wohlsen are analogous art because they are from the same field of endeavor of developing speech recognition systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the location for the grammar of Wohlsen with the grammar of Barclay. The motivation for doing so would have been to provide a location from which stored grammars can be matched to inputted data for comparison. (See Wohlsen, Page 1, paragraph 0007). Therefore, it would have been obvious to combine Wohlsen with Barclay

for the benefit of providing a storage location for previously inputted grammars to obtain the invention as specified in claims 2 and 39.

Claims 7, 27, 31, 44, and 58 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claims 4, 26, 37, and 45 above, and further in view of Holtz (U.S. Publication 2002/0031756 A1).

As per claims 7, 27, 31, 44 and 58, Barclay discloses the limitations of claims 4, 26, 37 and 45 as described above. Barclay does not disclose expressly that the markup language includes synchronized multimedia markup language. Holtz discloses that the system can be configured to support Synchronized Multimedia Integration Markup Language (SMIL). (See Holtz, Page 9-10, paragraph 0129). Barclay and Holtz are analogous art because they are from the same field of endeavor of processing data over the web using a markup language. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the Synchronized Multimedia Integration Markup Language (SMIL) of Holtz with the instruction indicating a grammar for speech recognition of Barclay. The motivation for doing so would have been to make the media streams compatible with the client workstations. (See Holtz, Page 10, paragraph 0129). Therefore, it would have been obvious to combine Holtz with Barclay for the benefit of client workstation compatibility to obtain the invention as specified in claims 7, 27, 31, 44 and 58.

Claims 10-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claim 1 above, and further in view of Baruch (U.S. Publication 2002/0091518 A1).

As per claim 10, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the markup language includes an instruction to audibly render an indication when the speech was not recognized. Baruch discloses that if the voice input is not recognized, the system may provide an audible (via loudspeaker) message to the user. (See Baruch, Page 4, paragraph 0041). Barclay and Baruch are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the audible response of Baruch with the markup language instructions of Barclay. The motivation for doing so would have been to provide audio feedback to the user. (See Baruch, Page 1, paragraph 0007). Therefore, it would have been obvious to combine Baruch with Barclay for the benefit of providing an audio response to the user to obtain the invention as specified in claim 10.

As per claim 11, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the markup language includes an instruction to visually render an indication when the speech was not recognized. Baruch discloses that if the voice input is not recognized, the system may provide a visual (via display unit) message to the user. (See Baruch, Page 4, paragraph 0041). Barclay and Baruch are analogous art because they are

from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the visual response of Baruch with the markup language instructions of Barclay. The motivation for doing so would have been to provide visual feedback to the user. (See Baruch, Page 1, paragraph 0007). Therefore, it would have been obvious to combine Baruch with Barclay for the benefit of providing a visual response to the user to obtain the invention as specified in claim 11.

Claims 18-20, 25, 36, and 52 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claims 1 and 50 above, and further in view of Ladd (U.S. Patent 6,385,583 B1).

As per claim 18, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the grammar includes a DTMF grammar. Ladd discloses that inputted DTMF tones are included in the processing of the speech communications. (See Ladd, Column 7, lines 61-67, Column 8, lines 1-3, and Column 14, lines 6-14). Barclay and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the DTMF grammar of Ladd with the grammar of Barclay. The motivation for doing so would have been to allow input from the user via DTMF tones. (See Ladd, Column 14, lines 7-9). Therefore, it would have been obvious

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to combine Ladd with Barclay for the benefit of allowing DTMF tone input to obtain the invention as specified in claim 18.

As per claim 19, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the markup language includes an instruction for handling a DTMF event. Ladd discloses that the system includes processing of events from the user inputted via speech or DTMF tones. (See Ladd, Column 4, lines 28-40). Barclay and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the processing of DTMF tones of Ladd with the markup language instructions of Barclay. The motivation for doing so would have been to allow input from the user via DTMF tones. (See Ladd, Column 14, lines 7-9). Therefore, it would have been obvious to combine Ladd with Barclay for the benefit of allowing DTMF tone input to obtain the invention as specified in claim 18.

As per claim 20, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the markup language includes an instruction for handling a call control event. Ladd discloses a system that handles call control events via a call control unit. (See Ladd, Column 8, lines 26-36). Barclay and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the call control instructions of Ladd with the

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markup language of Barclay. The motivation for doing so would have been to allow users to access the system from any number of locations using a variety of input devices. (See Ladd, Column 2, lines 19-39). Therefore, it would have been obvious to combine Ladd with Barclay for the benefit of allowing access to the system via a large number of locations and input devices to obtain the invention as specified in claim 20.

As per claim 25, Barclay and Ladd disclose the limitations of claim 20 as described above. Ladd also discloses that the markup language includes an instruction related to halting prompting using a "barge-in" attribute. (See Ladd, Column 17, lines 31-41).). Barclay and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the "barge-in" attribute of Ladd with the markup language of Barclay and Ladd. The motivation for doing so would have been to allow the processing to be interrupted at any time based on a predetermined response from the user. (See Ladd, Column 17, lines 39-41). Therefore, it would have been obvious to combine Ladd with Barclay and Ladd for the benefit of interrupting processing to obtain the invention as specified in claim 25.

Claim 36 is rejected on the same basis as claim 18.

As per claim 52, Barclay discloses the limitations of claim 50 as described above. Barclay does not disclose expressly that the event pertains to whether recognition was obtained. Ladd discloses an event, such as the displaying of an

error message, which is activated if the voice browser has difficulty recognizing inputs from the user. (See Ladd, Column 14, lines 40-53). Barclay and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the event pertaining to whether recognition was obtained of Ladd with the markup language instructions of Barclay. The motivation for doing so would have been to activate error handling code used to prompt the user to repeat his or her input. (See Ladd, Column 14, lines 54-60). Therefore, it would have been obvious to combine Ladd with Barclay for the benefit of enabling error handling in the event the input is not recognized to obtain the invention as specified in claim 52.

Claims 12-16, 33-34, 38, and 51 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claims 1, 32, 37, and 50 above, and further in view of Andreshak (U.S. Patent 5,664,061).

As per claims 12 and 51, Barclay discloses the limitations of claims 1 and 45 as described above. Barclay does not disclose expressly that the markup language includes an instruction to set a time period related to speech recognition. Andreshak discloses that a speech recognizer measures the value of at least one feature of an utterance during each of a series of successive time intervals within a second time period. (See Andreshak, Column 3, lines 31-35). Barclay and Andreshak are analogous art because they are from the same field

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of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the time period of Andreshak with the markup language instructions of Barclay. The motivation for doing so would have been to allow time for a sufficient amount of input data to be entered into the system in order to determine a match between the input and the stored vocabulary or grammar. (See Andreshak, Column 3, lines 34-41). Therefore, it would have been obvious to combine Andreshak with Barclay for the benefit of processing the input data to obtain the invention as specified in claims 12 and 51.

As per claim 13, Barclay and Andreshak disclose the limitations of claim 12 as described above. Andreshak also discloses that the time period indicates a maximum period of silence from a start recognition instruction. (See Andreshak Column 13, lines 1-10). Barclay and Andreshak are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the maximum time period of silence of Andreshak with the time period of Barclay and Andreshak. The motivation for doing so would have been to allow time for distinguishing silence from background noise. (See Andreshak, Column 12, lines 58-66). Therefore, it would have been obvious to combine Andreshak with Barclay for the benefit of determining whether the input is noise or silence to obtain the invention as specified in claim 13.

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As per claim 14, Barclay and Andreshak disclose the limitations of claim 12 as described above. Barclay also discloses that the time period indicates a maximum period before a result must be returned after detection of speech. (See Barclay, Column 7, lines 9-26).

As per claim 15, Barclay and Andreshak disclose the limitations of claim 12 as described above. Barclay also discloses that the time period indicates a maximum period before a result must be returned after a start recognition instruction. (See Barclay, Column 7, lines 9-26).

As per claim 16, Barclay and Andreshak disclose the limitations of claim 12 as described above. Barclay also discloses that the time period indicates a minimum period of silence to indicate an end of speech. (See Barclay, Column 7, lines 27-40).

As per claim 33, Barclay discloses the limitations of claim 32 as described above. Barclay does not disclose expressly that the processing includes normalizing the data indicative of the input speech. Andreshak discloses a normalization processor to normalize the input speech. (See Andreshak, Column 13, lines 23-35). Barclay and Andreshak are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the normalization of the input speech of Andreshak with the processing instructions of Barclay. The motivation for doing so would have been to adjust for variations in the loudness of the input speech. (See Andreshak, Column 13, lines 20-22). Therefore, it would have

been obvious to combine Andreshak with Barclay for the benefit of adjusting the volume level of the input speech to obtain the invention as specified in claim 33.

As per claim 34, Barclay discloses the limitations of claim 32 as described above. Barclay does not disclose expressly that the processing includes generating data indicative of parameters of the input speech. Andreshak discloses generating arguments in the form of parameters input to the function which are indicative of the input speech. (See Andreshak, Columns 27-29, example IV). Barclay and Andreshak are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the parameters of Andreshak with the processing instructions of Barclay. The motivation for doing so would have been to define the vocabulary or grammar. (See Andreshak, Column 27, lines 24-26). Therefore, it would have been obvious to combine Andreshak with Barclay for the benefit of defining the vocabulary or grammar to obtain the invention as specified in claim 34.

As per claim 38, Barclay discloses the limitations of claim 37 as described above. Barclay does not disclose expressly normalizing the data of the input prior to sending the data. Andreshak discloses a normalization processor to normalize the input speech. (See Andreshak, Column 13, lines 23-35). Barclay and Andreshak are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill

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in the art to include the normalization of the input speech of Andreshak with the processing instructions of Barclay. The motivation for doing so would have been to adjust for variations in the loudness of the input speech. (See Andreshak, Column 13, lines 20-22). Therefore, it would have been obvious to combine Andreshak with Barclay for the benefit of adjusting the volume level of the input speech to obtain the invention as specified in claim 38.

Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claim 1 above, and further in view of Brems (U.S. Patent 5,566,272).

As per claim 17, Barclay discloses the limitations of claim 1 as described above. Barclay does not disclose expressly that the markup language includes an instruction indicating a confidence measure to use for speech recognition. Brems discloses the use of a confidence measure for speech recognition processing. (See Brems, Figures 2 and 3) Barclay and Brems are analogous art because they are from the same field of endeavor of developing speech recognition systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the confidence measure of Brems with the processing of Barclay. The motivation for doing so would have been to better handle recognition errors. (See Brems, Column 1, lines 25-52). Therefore, it would have been obvious to combine Brems with Barclay for the benefit of reducing input speech recognition errors to obtain the invention as specified in claim 17.

Claims 21, 55, and 59-61 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claims 1 and 45 above, and further in view of Sturner (U.S. Patent 5,303,327).

As per claims 21 and 55, Barclay discloses the limitations of claims 1 and 45 as described above. Barclay does not disclose expressly that the markup language includes an instruction indicating for audibly prompting. Sturner discloses an audio prompt to ask to user to repeat his or her input. (See Sturner, Column 9, lines 46-49). Barclay and Sturner are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the audio prompt of Sturner with the markup language of Barclay. The motivation for doing so would have been to prompt the user to repeat the verbal input. (See Sturner, Column 9, lines 48-49). Therefore, it would have been obvious to combine Sturner with Barclay for the benefit of prompting the user to repeat his or her input to obtain the invention as specified in claims 21 and 55.

As per claim 59, Barclay discloses a computer readable medium having a markup language for execution on a client device in a client/server system that includes an instruction set indicating an object model element. (See Barclay, Column 4, lines 57-67, Column 5, lines 1-11, and Column 8, lines 26-28 and lines 42-48). Barclay does not disclose expressly the object model element including attributes for audibly prompting. Sturner discloses attributes for audibly

prompting. (See Sturner, Column 9, lines 46-49). Barclay and Sturner are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the audio prompt of Sturner with the markup language of Barclay. The motivation for doing so would have been to prompt the user to repeat the verbal input. (See Sturner, Column 9, lines 48-49). Therefore, it would have been obvious to combine Sturner with Barclay for the benefit of prompting the user to repeat his or her input to obtain the invention as specified in claim 59.

Claim 60 is rejected on the same basis as claim 5.

Claim 61 is rejected on the same basis as claim 6

Claims 22-24 and 63 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) and Sturner (U.S. Patent 5,303,327) as applied to claims 21 and 59 above, and further in view of Ball (U.S. Patent 6,240,391 B1).

As per claim 22, Barclay and Sturner disclose the limitations of claim 21 as described above. Barclay and Sturner do not disclose expressly that the markup language includes an instruction for prompting by converting text to speech. Ball discloses converting text to speech using a text-to-speech processor. (See Ball, Column 3, lines 34-36). Barclay, Sturner and Ball are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the

invention it would have been obvious to a person of ordinary skill in the art to include the text-to-speech processing of Ball with the markup language of Barclay and Sturner. The motivation for doing so would have been to allow the textual fragments to be retrieved from a designated address. (See Ball, Column 3, lines 9-14). Therefore, it would have been obvious to combine Ball with Barclay and Sturner for the benefit of improved data storage to obtain the invention as specified in claim 22.

As per claim 23, Barclay and Sturner disclose the limitations of claim 21 as described above. Barclay and Sturner do not disclose expressly that the markup language includes an instruction for prompting by playing a selected audio stream. Ball discloses playing an audio file. (See Ball, Column 3, lines 36-39). Barclay, Sturner and Ball are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the audio file of Ball with the markup language and prompt of Barclay and Sturner. The motivation for doing so would have been to provide a verbal prompt to the user. (See Ball, Column 3, lines 36-39). Therefore, it would have been obvious to combine Ball with Barclay and Sturner for the benefit of providing a verbal prompt to the user to obtain the invention as specified in claim 23.

As per claim 24, Barclay and Sturner disclose the limitations of claim 21 as described above. Barclay and Sturner do not disclose expressly that the markup language includes an instruction for retrieving a value for use in

prompting. Ball discloses retrieving a user's touch-tone keypad inputs. (See Ball, Column 3, lines 39-47). Barclay, Sturner and Ball are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the touch-tone keypad inputs of Ball with the markup language instructions of Barclay and Sturner. The motivation for doing so would have been to effect interaction and navigation within the structured message as allowed by the markup within the message. (See Ball, Column 3, lines 44-47). Therefore, it would have been obvious to combine Ball with Barclay and Sturner for the benefit of allowing interaction and navigation within the message to obtain the invention as specified in claim 24.

As per claim 63, Barclay and Sturner disclose the limitations of claim 59 as described above. Barclay and Sturner do not disclose expressly that the element includes playing an audio file. Ball discloses playing an audio file. (See Ball, Column 3, lines 36-39). Barclay, Sturner and Ball are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the audio file of Ball with the markup language and prompt of Barclay and Sturner. The motivation for doing so would have been to provide a pre-recorded response to the user. (See Ball, Column 8, lines 28-31). Therefore, it would have been obvious to combine

Ball with Barclay and Sturner for the benefit of providing a pre-recorded response to the user to obtain the invention as specified in claim 63.

Claims 66-68 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) and Sturner (U.S. Patent 5,303,327) as applied to claims 21 and 59 above, and further in view of Ladd (U.S. Patent 6,385,583 B1).

As per claim 66, Barclay and Sturner disclose the limitations of claim 59 as described above. Barclay and Sturner do not disclose expressly that one of the attributes includes a period of time when prompting can be interrupted. Ladd discloses that the markup language includes an instruction related to halting prompting at any time using a "bargain" attribute. (See Ladd, Column 17, lines 31-41).). Barclay, Sturner, and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the bargain attribute of Ladd with the markup language of Barclay and Sturner. The motivation for doing so would have been to allow the processing to be interrupted at any time based on a predetermined response from the user. (See Ladd, Column 17, lines 39-41). Therefore, it would have been obvious to combine Ladd with Barclay and Sturner for the benefit of interrupting processing to obtain the invention as specified in claim 66.

As per claim 67, Barclay and Sturner disclose the limitations of claim 59 as described above. Barclay and Sturner do not disclose expressly that the markup language includes instructions for handling an event related to prompting. Ladd discloses that the markup language includes a PROMPT element. (See Ladd, Column 17, lines 65-67, and Column 18, lines 1-21). Barclay, Sturner, and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the PROMPT element of Ladd with the markup language of Barclay and Sturner. The motivation for doing so would have been to define the application state. (See Ladd, Column 18, lines 9-10). Therefore, it would have been obvious to combine Ladd with Barclay and Sturner for the benefit of defining the state of the application to obtain the invention as specified in claim 67.

As per claim 68, Barclay, Sturner, and Ladd disclose the limitations of claim 67 as described above. Ladd also discloses an event that pertains to whether prompting is being interrupted in the form of a "BARGEIN" element. (See Ladd, Column 17, lines 65-67, and Column 18, lines 1-8). Barclay, Sturner, and Ladd are analogous art because they are from the same field of endeavor of developing markup languages for services in which clients interact with a server. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the "BARGEIN" element of Ladd with the markup language of Barclay, Sturner and Ladd. The motivation for doing so would have

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been to allow the processing to be interrupted at any time based on a predetermined response from the user. (See Ladd, Column 17, lines 39-41). Therefore, it would have been obvious to combine Ladd with Barclay, Sturner, and Ladd for the benefit of interrupting processing to obtain the invention as specified in claim 68.

Claim 62 is rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) and Sturner (U.S. Patent 5,303,327) as applied to claim 59 above, and further in view of Holtz (U.S. Publication 2002/0031756 A1).

As per claim 62, Barclay and Sturner disclose the limitations of claim 59 as described above. Barclay and Sturner do not disclose expressly that the markup language includes a synchronized markup language. Holtz discloses that the system can be configured to support Synchronized Multimedia Integration Markup Language (SMIL). (See Holtz, Page 9-10, paragraph 0129). Barclay, Sturner, and Holtz are analogous art because they are from the same field of endeavor of processing data over the web using a markup language. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the Synchronized Multimedia Integration Markup Language (SMIL) of Holtz with the markup language of Barclay and Sturner. The motivation for doing so would have been to make the media streams compatible with the client workstations. (See Holtz, Page 10, paragraph 0129). Therefore, it

would have been obvious to combine Holtz with Barclay for the benefit of client workstation compatibility to obtain the invention as specified in claim 62.

Claims 53 and 54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) as applied to claim 50 above, and further in view of Fox (U.S. Publication 2002/0077823 A1).

As per claim 53, Barclay discloses the limitations of claim 50 as described above. Barclay does not disclose expressly an event pertaining to when a DTMF key is pressed. Fox discloses simulating voice interactions with an end user through the use of DTMF buttons. (See Fox, Page 7, paragraph 0077). Barclay and Fox are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the DTMF input of Fox with the event processing of Barclay. The motivation for doing so would have been to allow the developer to enter text that would correspond to what an end user would say in response to a prompt from the application. (See Fox, Page 7, paragraph 0077) Therefore, it would have been obvious to combine Fox with Barclay for the benefit of inputting data via DTMF keys rather than speech to obtain the invention as specified in claim 53.

As per claim 54, Barclay and Fox disclose the limitations of claim 53 as described above. Fox also discloses that the event pertains to call control. (See Fox, Page 7, paragraph 0077) Barclay and Fox are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for

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user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the call control events of Fox with the event of Barclay. The motivation for doing so would have been to allow a developer to simulate a call initiation. (See Fox, Page 7, paragraph 0077) Therefore, it would have been obvious to combine Fox with Barclay for the benefit of simulating call initiation to obtain the invention as specified in claim 54.

Claims 64 and 65 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barclay (U.S. Patent 5,960,399) and Sturner (U.S. Patent 5,303,327) as applied to claim 59 above, and further in view of Fox (U.S. Publication 2002/0077823 A1).

As per claim 64, Barclay and Sturner disclose the limitations of claim 59 as described above. Barclay and Sturner do not disclose expressly that the element includes converting text-to-speech. Fox discloses converting text-to-speech. (See Fox, Page 6, paragraph 0071) Barclay, Sturner and Fox are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the conversion of text-to-speech of Fox with the markup language instructions of Barclay and Sturner. The motivation for doing so would have been to aurally describe the contents of a web page to an end user. (See Fox, Page 6, paragraph 0071) Therefore, it would have been obvious to combine Fox

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with Barclay and Sturner for the benefit of aurally communicating data to the end user to obtain the invention as specified in claim 64.

As per claim 65, Barclay, Sturner and Fox disclose the limitations of claim 64 as described above. Fox also discloses that the element obtains dynamic content for converting text-to-speech. (See Fox, Page 6, paragraph 0071, and Page 7, paragraph 0075) Barclay, Sturner and Fox are analogous art because they are from the same field of endeavor of utilizing speech recognition systems for user input and output. At the time of the invention it would have been obvious to a person of ordinary skill in the art to include the conversion of dynamic content from text to speech with the markup language instructions of Barclay and Sturner. The motivation for doing so would have been to aurally describe the contents of a web page to an end user. (See Fox, Page 6, paragraph 0071) Therefore, it would have been obvious to combine Fox with Barclay and Sturner for the benefit of aurally communicating data to the end user to obtain the invention as specified in claim 65.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- Albayrak (U.S. Patent 6,662,163 B1) discloses a system and method for programming portable devices from a remote computer system.

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- Brown (U.S. Patent 6,604,075 B1) discloses a web-based voice dialog interface.
- Baker (U.S. Patent 6,456,974 B1) discloses a system and method for adding speech recognition capabilities to Java.
- Giangarra (U.S. Patent 6,101,472) discloses a data processing system and method for navigating a network using voice command.
- Dragosh (U.S. Patent 6,078,886) discloses a system and method for providing remote automatic speech recognition services via a packet network.
- Chou (U.S. Patent 5,737,489) discloses a system and method of discriminative utterance verification for connected digits recognition.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Laurie Ries whose telephone number is currently (703) 605-1238. After mid-October, 2004, the examiner can be reached at (571) 272-4095. The examiner can normally be reached on Monday-Friday from 7:00am to 3:30pm.

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questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

LAR


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PRIMARY EXAMINER